

Mirror MEMS attenuators(MEMS VOA) are based on a micro-electro-mechanical system (MEMS) technology. The MEMS attenuators design achieves highly repeatable optical attenuation over C and/or L band through an electrically movable mirror on silicon.

Product Features

- ◆ Low insertion loss
- ◆ Low polarization dependent
- ◆ Compact size
- ◆ Available in both normally open and normally closed states
- ◆ Excellent reliability

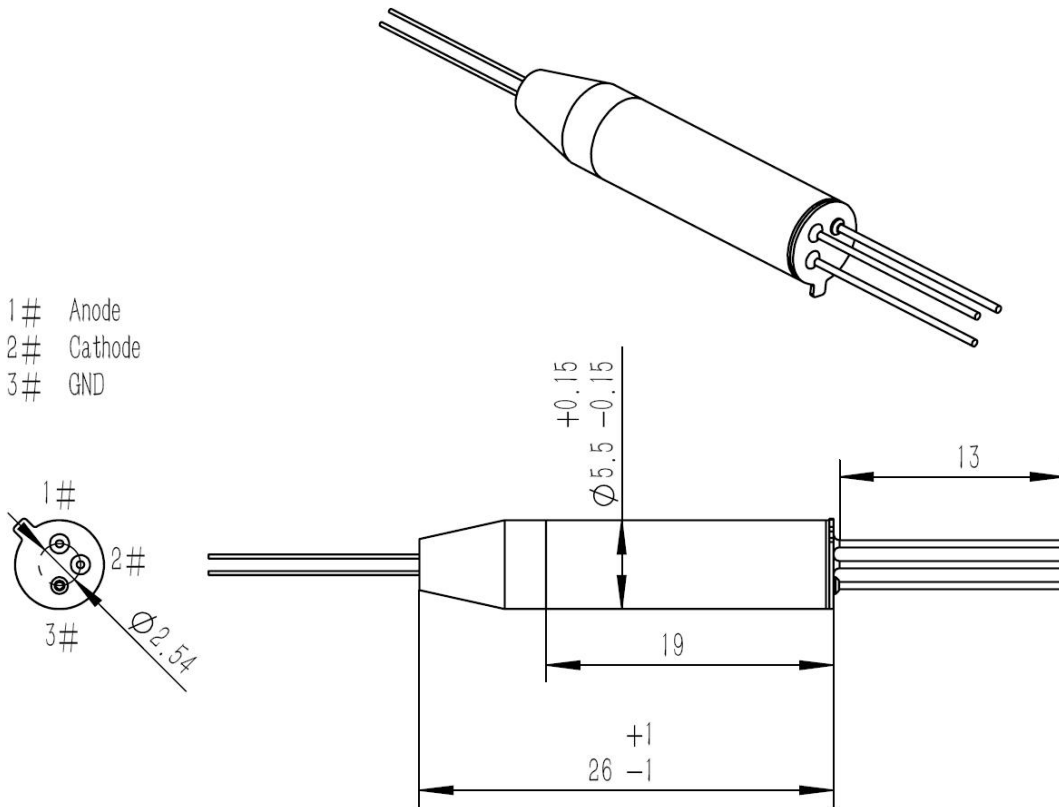
Product Application

- ◆ Power Management
- ◆ Receiver protective
- ◆ Channel Balance
- ◆ Instrumentation

Specifications

Parameters	Unit	Specifications
Wavelength Range	nm	850±40 / 1310±40
Test Wavelength	nm	850 / 1310
Attenuation Type		Bright / Dark
Insertion Loss ^{1, 2}	dB	≤ 1.2
Attenuation Range ³	dB	20/30/40
Attenuation Resolution	dB	Continuous
Return Loss	dB	≥ 30
TDL	dB	@0~10dB ≤1.0
		@10~20dB ≤ 2.0
Repeatability	dB	≤ 0.1
Operating Voltage	V	≤ 9
Durability	Cycles	≥ 10 ⁹
Response Time	ms	≤ 5
Optical Power	mW	≤ 500
Operating Temperature	°C	-5 ~ +75
Storage Temperature	°C	-40 ~ +85
Relative Humidity	%	5 ~ 95
Dimension	mm	(Φ) 5.5x (L) 19±0.2
Note: ¹ Room temperature, Excluding connectors, add 0.2dB one pair connectors. ² For dark type, the voltage is 9V with 0dB attenuation. ³ The voltage is 9v for the attenuation arrange .		

MECHANICAL DRAWINGS



Ordering Information

FW-MM VOA-A-B-C-D-E-F

A	B	C	D	E	F
Attenuation w/o voltage	Fiber Type	Test Wavelength	Tube Type	Fiber Length	Connector
BR: Bright	M5: MM, 50/125	850: 850nm	25: 250um	05: 0.5m±5cm	OO: None
DK: Dark	M6: MM, 62.5/125	1310: 1310nm	90: 900um	10: 1.0m±5cm	FP: FC/PC
	X: Others	X: Others	X: Others	X: Others	FA: FC/APC
					SP: SC/PC
					SA: SC/APC
					LP: LC/PC
					LA: LC/APC
					X: Others